Preparing for Climate Change A Guidebook for Local, Regional, and State Governments



Climate science in the public interest

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The Climate Impacts Group

1st of 8 U.S. Regional Integrated Sciences and Assessment (RISA) teams

Areas of study:

- Water resources
- Salmon
- Forests
- Coasts
- [Agriculture, Human Health]



Objectives

- Increase the region's resilience to climate variability and change
- Produce science useful to (and used by!) decision makers



- Motivation for writing grew out of October 2005 King County climate change conference
- Written by the CIG and King County, WA in association with ICLEI – Local Governments for Sustainability
- Written to compliment ICLEI's "Climate Resilient Communities" Program
- Focused on the process (not a sector), and written for a national audience

PREPARING FOR CLIMATE CHANGE

A Guidebook for Local, Regional, and State Governments













Written by

Center for Science in the Earth System (The Climate Impacts Group) Joint Institute for the Study of the Atmosphere and Ocean University of Washington

King County, Washington

With an introduction by King County Executive Ron Sims







Why Adaptive Planning?....



- Significant climate change impacts are projected, and the impacts expected within the next few decades are largely unavoidable.
- Decisions with long-term impacts are being made every day. Today's choices will shape tomorrow's vulnerabilities.
- Significant time is required to motivate and develop adaptive capacity, and to implement changes.
- In many (if not most) cases, it will cost more to retrofit for climate resilience than to build for it in the first place.



...and Why the Local Scale?



- Local, regional, and state governments are on the "front line" for climate change impacts
- Managing the risks associated with climate change is an inherent part of ensuring for the safety, health, and welfare of a community
- Planning for climate change can benefit the present (e.g., drought management plans)
- Preparing for climate change may lead to new economic opportunities and reduce future costs



Planning for Climate Change

a.k.a, the core guidebook content

- Collect and review basic information on climate change impacts to your region
- Build internal and external support for climate change preparedness
- Create your preparedness team
- Identify your community's vulnerabilities to climate change
- Develop and implement your preparedness plan
- Measure your progress and update your plan



Guiding Principles for Planning

- Increase public awareness of climate change and projected impacts
- Develop and maintain technical capacity to prepare for climate change impacts
- "Mainstream" information about climate change vulnerabilities, risks, and preparedness into planning, policy, and investment decisions
- Increase the adaptive capacity of built, natural, and human systems in your community.
- Strengthen community partnerships that reduce vulnerability and risk.



Policy "Red Flags"

Flexibility is essential. Characteristics of policies governing climate-sensitive resources that can limit adaptability:



Policies that do not allow regular re-evaluation and adjustment in accordance with changing conditions



Policies that *require* planning based strictly on the past, or pin certain decisions/triggers to certain periods or seasonal patterns



Policies that reinforce trends that increase vulnerability or reduce adaptability (e.g., development along flood plains)

General Implementation Tools

- Zoning rules and regulations
- Taxation (including tax incentives)
- Building codes/design standards
- Utility rates/fee setting
- Public safety rules and regulations
- Issuance of bonds
- Infrastructure development
- Permitting and enforcement
- Best management practices
- Outreach and education
- Emergency management powers
- Partnership building with other communities



Planning for Uncertainty

Look to implement

"No regrets" strategies

Provides benefits now with or without climate change (e.g., water conservation program)

"Low regrets" strategies

Provide climate change benefits for little additional cost or risk (e.g., adding 10% capacity rather than 5%)

"Win-win" strategies

Reduce climate change impacts while providing other environmental, social, or economic benefits (e.g., wetlands protection)



More information on PNW climate impacts and planning for climate change is available from

The Climate Impacts Group

www.cses.washington.edu/cig

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